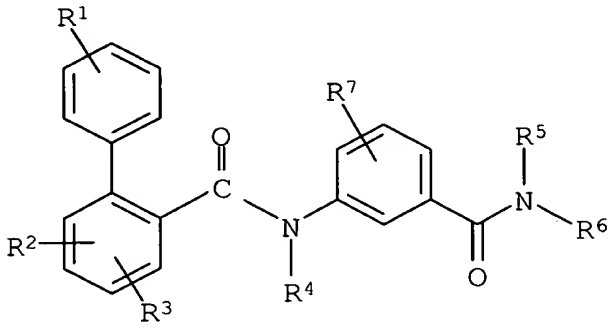
We Claim:

1. A Biphenylcarboxylic acid amide of the following formula (I):



, (I)

wherein

R^1, R^2 and R^3, which may be identical or different, in each case denote a hydrogen, fluorine, chlorine or bromine atom, a straight-chain or branched C_{1-3}-alkyl group wherein the hydrogen atoms may be wholly or partially replaced by fluorine atoms, a hydroxy, C_{1-3}-alkoxy, amino, C_{1-3}-alkylamino- or di-(C_{1-3}-alkyl)-amino group,

wherein R^1 and R^2 in the ortho,ortho' position of the biphenyl group of formula I together may also denote a carbonyl group,

R^4 denotes a hydrogen atom or a C_{1-3}-alkyl group,

R^5 denotes a hydrogen atom or a straight-chain or branched C_{1-6}-alkyl group and

R^6 denotes a straight-chain or branched C_{1-6}-alkyl group,

an amino, C_{1-3}-alkylamino or di-(C_{1-3}-alkyl)-amino group,

a C_{3-7}-cycloalkylamino or N-(C_{1-3}-alkyl)-C_{3-7}-cycloalkyl-amino group, wherein

in each case the methylene group in the 4 position of a 6- or 7-membered cycloalkyl group may be replaced by an oxygen or sulphur atom or by an imino group optionally substituted by a C_{1-3}-alkyl, phenyl, C_{1-3}-alkyl-carbonyl, benzoyl, phenyl-(C_{1-3}-alkyl)-carbonyl, C_{1-3}-alkyl-aminocarbonyl, di-(C_{1-3}-alkyl)-aminocarbonyl, phenylaminocarbonyl or N-(C_{1-3}-alkyl)-phenylaminocarbonyl group,

an arylamino, N-(C_{1-3}-alkyl)-arylamino, heteroarylamino, N-(C_{1-3}-alkyl)-heteroarylamino, C_{1-7}-alkyl-carbonylamino, N-(C_{1-3}-alkyl)-C_{1-7}-alkyl-carbonylamino, arylcarbonylamino, heteroarylcarbonylamino, N-(C_{1-3}-alkyl)-arylcarbonylamino, N-(C_{1-3}-alkyl)-heteroarylcarbonylamino, C_{1-8}-alkoxy-carbonyl-amino or N-(C_{1-3}-alkyl)-(C_{1-8}-alkoxy)-carbonylamino group,

an aryl, aryl-carbonyl-aryl, aryl-C_{1-3}-alkoxy-aryl or aryl-C_{1-3}-alkyl-aryl group,

a heteroaryl group,

an aryl group substituted by a heteroaryl group,

a C_{3-7}-cycloalkyl or C_{3-7}-cycloalkyl-aryl group, while

in each case the methylene group in the 4 position of a 6- or 7-membered cycloalkyl group may be replaced by an oxygen or sulphur atom or by an imino group optionally substituted by a C_{1-3}-alkyl, phenyl, C_{1-3}-alkyl-carbonyl, benzoyl, phenyl-(C_{1-3}-alkyl)-carbonyl, C_{1-3}-alkyl-aminocarbonyl, di-(C_{1-3}-alkyl)-aminocarbonyl, phenylaminocarbonyl or N-(C_{1-3}-alkyl)-phenylaminocarbonyl group, or

the two hydrogen atoms of the methylene group in the 3 position of a cyclopentyl group or in the 3- or 4-position of a cyclohexyl or cycloheptyl group may be replaced by an n-butylene, n-pentylene, n-hexylene, 1,2-ethylenedioxy or 1,3-propylenedioxy group or

in a 5- or 6-membered cycloalkyl group one or two single bonds separated from each other and from position 1 by at least one bond may each be fused with a phenyl group,

a phenylcarbonylamino-aryl, phenylaminocarbonyl-aryl, N-(C_{1-3}-alkyl)-phenylcarbonylamino-aryl or N-(C_{1-3}-alkyl)-phenylaminocarbonyl-aryl group,

a straight-chain C_{1-4}-alkyl group optionally substituted in the 1 position by a C_{3-5}-cycloalkyl group or a C_{1-3}-alkyl group, which is terminally substituted

by an aryl or heteroaryl group,

by an aryl-C C-, heteroaryl-C C-, aryl-CH=CH- or heteroaryl-CH=CH- group,

by an aryl group which is fused to a heteroaryl group via two adjacent carbon atoms,

by a heteroaryl group which is fused to an aryl or heteroaryl group via two adjacent carbon atoms or, in the case of a 5-membered heteroaryl group, via an imino nitrogen atom and an adjacent carbon atom,

by an aryl group which is substituted

by an aryl or heteroaryl group,

by a C_{3-7}-cycloalkyl group or a 4 to 7 membered cycloalkyleneimino group, which

may each be fused to a phenyl ring via two adjacent carbon atoms or

wherein the two hydrogen atoms of the methylene group in the 3 position of a 5-membered ring or in position 3 or 4 of a 6- or 7-membered ring may be replaced by an n-butylene,

n-pentylene, n-hexylene, 1,2-ethylenedioxy or 1,3-propylenedioxy group or by an oxygen atom or

wherein in each case the methylene group in the 4 position of a 6- or 7-membered ring may be replaced by an oxygen or sulphur atom or by an imino group optionally substituted by a C_{1-3}-alkyl, phenyl, C_{1-8}-alkyl-carbonyl, C_{1-8}-alkoxycarbonyl, benzoyl, phenyl-(C_{1-3}-alkyl-carbonyl), C_{1-3}-alkyl-aminocarbonyl, di-(C_{1-3}-alkyl)-aminocarbonyl, phenylaminocarbonyl or N-(C_{1-3}-alkyl)-phenylaminocarbonyl group,

or by a phenylaminosulphonyl or phenylsulphonylamino group,

by a C_{3-7}-cycloalkyl group wherein

in each case the methylene group in the 4 position of a 6- or 7-membered cycloalkyl group may be replaced by an oxygen or sulphur atom or by an imino group optionally substituted by a C_{1-3}-alkyl, phenyl, C_{1-8}-alkyl-carbonyl, C_{1-8}-alkoxycarbonyl, benzoyl, phenyl-(C_{1-3}-alkylcarbonyl), C_{1-3}-alkylaminocarbonyl, di-(C_{1-3}-alkyl)-aminocarbonyl, phenylaminocarbonyl or N-(C_{1-3}-alkyl)-phenylaminocarbonyl group,

by a phenylcarbonylamino-aryl, phenylaminocarbonyl-aryl, N-(C_{1-3}-alkyl)-phenylcarbonylamino-aryl or N-(C_{1-3}-alkyl)-phenylaminocarbonyl-aryl group,

by a heteroarylcarbonylamino-aryl, heteroarylaminocarbonyl-aryl, heteroarylcarbonyl-N-(C_{1-3}-alkyl)-amino-aryl or heteroaryl-N-(C_{1-3}-alkyl)-aminocarbonyl-aryl group,

by a straight-chain or branched C_{4-7}-alkyl-carbonylamino-aryl or N-(C_{1-3}-alkyl)-C_{4-7}-alkyl-carbonylamino-aryl group,

by a C_{3-7}-cycloalkyl-carbonylamino-aryl or N-(C_{1-3}-alkyl)-C_{3-7}-cycloalkyl-carbonylamino-aryl group,

by a C_{3-7}-Cycloalkyl-aminocarbonyl-aryl or N-(C_{1-3}-alkyl)-C_{3-7}-cycloalkyl-aminocarbonyl-aryl group,

by a cycloalkyleneimino-carbonylamino-aryl or cycloalkyleneimino-carbonyl-N-(C_{1-3}-alkyl)-amino-aryl group wherein the cycloalkyleneimino moiety is 4- to 7-membered,

by an aryl-aminocarbonylamino-aryl group wherein one or both amino-hydrogen atoms may each be replaced by a C_{1-3}-alkyl group,

by a hydroxycarbonyl, C_{1-3}-alkoxycarbonyl, C_{3-7}-cyclo-alkyloxycarbonyl, aryloxycarbonyl, heteroaryloxycarbonyl, aryl-C_{1-3}-alkoxycarbonyl or heteroaryl-C_{1-3}-alkoxycarbonyl group or

by an aminocarbonyl, C_{1-3}-alkyl-aminocarbonyl, aryl-C_{1-3}-alkyl-aminocarbonyl, N-(C_{1-3}-alkyl)-aryl-C_{1-3}-alkyl-aminocarbonyl, di-(C_{1-3}-alkyl)-aminocarbonyl, aminocarbonyl-C_{1-3}-alkyl-aminocarbonyl or C_{1-3}-alkoxy-carbonyl-C_{1-3}-alkyl-aminocarbonyl group,

a straight-chain or branched C_{2-6}-alkyl group which is terminally substituted .

by a hydroxy, C_{1-3}-alkoxy, aryloxy, heteroaryloxy- aryl-C_{1-3}-alkoxy or heteroaryl-C_{1-3}-alkoxy group,

by an amino, C_{1-3}-alkylamino, di-(C_{1-3}-alkyl)-amino, C_{1-3}-alkyl-carbonylamino, N-(C_{1-3}-alkyl)-C_{1-3}-alkylcarbonylamino, arylcarbonylamino, heteroarylcarbonylamino, N-(C_{1-3}-alkyl)-arylcarbonylamino or N-(C_{1-3}-alkyl)-heteroarylcarbonylamino group,

or R^5 and R^6 together with the enclosed nitrogen atom denote a 4- to 7-membered cycloalkyleneimino group wherein the cycloalkylene moiety may be fused to a phenyl ring,

R^7 denotes a hydrogen, fluorine, chlorine, bromine or iodine atom, a C_{1-3}-alkyl, C_{1-3}-alkoxy, nitro or amino group,

wherein by the term aryl group mentioned above is meant a phenyl, 1-naphthyl or 2-naphthyl group,

by the term heteroaryl group mentioned above is meant a 5-membered heteroaromatic ring linked via a nitrogen or carbon atom, which contains

an imino group, an oxygen or sulphur atom,

an imino group and an oxygen, sulphur or nitrogen atom,

an imino group and two nitrogen atoms or

an oxygen or sulphur atom and two nitrogen atoms,

or a 6-membered heteroaromatic ring linked via a carbon atom which contains one or two nitrogen atoms,

and wherein a 1,4-butadienylene group may be attached both to the abovementioned 5-membered heteroaromatic rings via two adjacent carbon atoms or via an imino nitrogen atom and an adjacent carbon atom and also to the 6-membered heteroaromatic rings in each case via two adjacent carbon atoms and the bicyclic heteroaromatic rings thus formed may also be bonded via a carbon atom of the 1,4- butadienylene group,

a hydrogen atom bonded to a nitrogen atom of the abovementioned 5-membered monocyclic or fused heteroaryl groups may be replaced by a C_{1-3}-alkyl, phenyl, phenyl-C_{1-3}-alkyl, C_{1-3}-alkylcarbonyl, phenylcarbonyl or phenyl-C_{1-3}-alkylcarbonyl group,

all the abovementioned phenyl, aryl and heteroaryl groups as well as aromatic or heteroaromatic parts of molecules in the carbon skeleton may be monosubstituted by a fluorine, chlorine or bromine atom, by a straight-chain or branched C_{1-4}-alkyl group, by a C_{3-7}-cycloalkyl or a 4- to 7-membered cycloalkyleneimino group, while

in each case the methylene group in position 4 of a 6- or 7-membered cycloalkyleneimino group may be replaced by an oxygen or sulphur atom, by a sulphinyl or sulphonyl group or by an imino group optionally substituted by a C_{1-5}-alkyl, phenyl, C_{1-4}-alkyl-carbonyl, C_{1-4}-alkoxy-carbonyl, C_{1-3}-alkyl-aminocarbonyl or di-(C_{1-3}-alkyl)-aminocarbonyl group,

by a trifluoromethyl, phenyl, hydroxy, C_{1-3}-alkoxy, phenyl-C_{1-3}-alkoxy, difluoromethoxy, trifluoromethoxy, amino, C_{1-3}-alkylamino, di-(C_{1-3}-alkyl)-amino, amino-C_{1-3}-alkyl, tert.butoxycarbonylamino-C_{1-3}-alkyl, C_{1-3}-alkylamino-C_{1-3}-alkyl, di-(C_{1-3}-alkyl)-amino-C_{1-3}-alkyl, amino-C_{1-3}-alkyl-carbonyl-amino, C_{1-3}-alkylamino-C_{1-3}-alkyl-carbonyl-amino, di-(C_{1-3}-alkyl)-amino-C_{1-3}-alkyl-carbonyl-amino, phenylamino, N-(C_{1-3}-alkyl)-phenylamino, acetylamino, propionylamino, benzoylamino, N-(C_{1-3}-alkyl)-benzoylamino, acetyl, propionyl, benzoyl, hydroxycarbonyl, C_{1-4}-alkoxycarbonyl, aminocarbonyl, C_{1-3}-alkylamino-carbonyl, 2,2,2-trifluoroethyl-aminocarbonyl or di-(C_{1-3}-alkyl)aminocarbonyl group, by a 4- to 7-membered cycloalkyleneimino-carbonyl group or a cyano group or, with the exception of 5-membered heteroaryl groups or heteroaromatic parts of molecules containing more than two heteroatoms, may also be disubstituted by one of the abovementioned substituents and one substituent selected from among fluorine, chlorine, bromine, C_{1-3}-alkyl, trifluoromethyl, C_{1-3}-alkoxy, hydroxy and amino, wherein two adjacent hydrogen atoms in a phenyl group or a phenyl moiety contained in the groups defined above may also be replaced by a methylenedioxy or 1,2-ethylenedioxy group, or may also be trisubstituted by three substituents selected from among fluorine, chlorine and bromine atoms and C_{1-3}-alkyl

groups, wherein the substituents may be identical or different and the abovementioned phenyl groups or phenyl moieties may in turn be substituted by a fluorine, chlorine or bromine atom, by a methyl, trifluoromethyl or methoxy group,

in all the abovementioned 4- to 7-membered cycloalkyleneimino groups the cycloalkylene moiety may be fused to a phenyl ring or

one or two hydrogen atoms in each case may be replaced by a C_{1-3}-alkyl group and/or

in each case the methylene group in position 4 of a 6- or 7-membered cycloalkyleneimino group may be substituted by a hydroxycarbonyl, C_{1-6}-alkoxycarbonyl, aminocarbonyl, C_{1-3}-alkylamino-carbonyl, di-(C_{1-3}-alkyl)-aminocarbonyl, phenyl-C_{1-3}-alkylamino or N-(C_{1-3}-alkyl)-phenyl-C_{1-3}-alkylamino group or

may be replaced by an oxygen or sulphur atom, by a sulphinyl or sulphonyl group or by an imino group optionally substituted by a C_{1-3}-alkyl, phenyl, C_{1-3}-alkyl-carbonyl, benzoyl, phenyl-C_{1-3}-alkyl-carbonyl, C_{1-3}-alkyl-aminocarbonyl, di-(C_{1-3}-alkyl)-aminocarbonyl, phenylaminocarbonyl or N-(C_{1-3}-alkyl)-phenylaminocarbonyl group,

the hydrogen atoms in the C_{1-3}-alkyl and alkoxy groups mentioned in the definition of the above groups may be wholly or partially replaced by fluorine atoms,

additionally any carboxy, amino or imino group present in the abovementioned groups may be substituted by a group which can be cleaved *in vivo,*

or a tautomer, a diastereomer, or an enantiomer, or mixtures thereof or a salt thereof.

2. A compound of formula I according to claim 1, wherein

R^1 denotes a hydrogen, fluorine, chlorine or bromine atom or a C_{1-3}-alkyl group wherein the hydrogen atoms may be wholly or partially replaced by fluorine atoms,

R^2 denotes a hydrogen atom or a C_{1-3}-alkyl group or

R^1 and R^2 in the ortho, ortho' position of the biphenyl group of formula I together denote a carbonyl group,

R^3, R^4 and R^5 which may be identical or different, each denote a hydrogen atom or a C_{1-3}-alkyl group,

R^6 denotes a straight-chain or branched C_{1-4}-alkyl group,

an amino, C_{1-3}-alkylamino or di-(C_{1-3}-alkyl)-amino group,

a C_{3-7}-cycloalkylamino or N-(C_{1-3}-alkyl)-C_{3-7}-cycloalkyl-amino group, wherein

in each case the methylene group in the 4 position of the cyclohexyl group may be replaced by an oxygen or sulphur atom or by an imino group optionally substituted by a C_{1-3}-alkyl, phenyl, C_{1-3}-alkyl-carbonyl, C_{1-8}-alkoxy-carbonyl, benzoyl, C_{1-3}-alkyl-aminocarbonyl, di-(C_{1-3}-alkyl)-aminocarbonyl, phenyl-aminocarbonyl or N-(C_{1-3}-alkyl)-phenylaminocarbonyl group,

a phenylamino, 1-naphthylamino or 2-naphthylamino group optionally substituted at the nitrogen atom by a C_{1-3}-alkyl group,

a C_{1-4}-alkyl-carbonylamino, phenylcarbonylamino or C_{1-8}-alkoxy-carbonylamino group,

a phenyl, biphenyl, 1-naphthyl, 2-naphthyl, phenylcarbonyl-phenyl, phenyl-C_{1-3}-alkoxyphenyl or phenyl-C_{1-3}-alkylphenyl group which may be substituted in the aromatic moieties in each case by a fluorine, chlorine, bromine or iodine atom, by a straight-chain or branched C_{1-4}-alkyl group, by a trifluoromethyl, hydroxy, C_{1-3}-alkoxy,

amino, C_{1-3}-alkylamino, di-(C_{1-3}-alkyl)-amino, acetylamino, benzoylamino, acetyl, benzoyl, C_{1-3}-alkylamino-carbonyl or cyano group,

a heteroaryl group or a heteroaryl-phenyl group,

a C_{3-7}-cycloalkyl or C_{3-7}-cycloalkyl-phenyl group, wherein

in each case the methylene group in the 4 position of the cyclohexyl group may be replaced by an oxygen or sulphur atom or by an imino group optionally substituted by a C_{1-3}-alkyl, phenyl, C_{1-3}-alkylcarbonyl, benzoyl, C_{1-3}-alkyl-aminocarbonyl, di-(C_{1-3}-alkyl)-aminocarbonyl, phenylaminocarbonyl or N-(C_{1-3}-alkyl)-phenylaminocarbonyl group, or

the two hydrogen atoms of the methylene group in the 3 position of a cyclopentyl group or in the 4-position of a cyclohexyl group may be replaced by an n-butylene, n-pentylene, 1,2-ethylenedioxy or 1,3-propylenedioxy group or

in a cyclopentyl or cyclohexyl group one or two single bonds separated from each other and from position 1 by at least one bond may each be fused to a phenyl group,

a phenylcarbonylamino-phenyl, phenylaminocarbonyl-phenyl, N-(C_{1-3}-alkyl)-phenylcarbonylamino-phenyl or N-(C_{1-3}-alkyl)-phenylaminocarbonyl-phenyl group,

a straight-chain C_{1-4}-alkyl group optionally substituted in the 1 position by a cyclopropyl group or a C_{1-3}-alkyl group, which is terminally substituted

by a phenyl, biphenyl, 1-naphthyl or 2-naphthyl group optionally substituted by a fluorine, chlorine, bromine or iodine atom, a straight-chain or branched C_{1-4}-alkyl group, a trifluoromethyl, hydroxy, C_{1-3}-alkoxy, difluoromethoxy, benzyloxy, aminomethyl, amino, C_{1-3}-alkylamino, di-(C_{1-3}-alkyl)-amino, phenylamino, N-(C_{1-3}-alkyl)-phenylamino,

acetylamino, acetyl, propionyl, benzoyl, hydroxycarbonyl, C_{1-4}-alkoxycarbonyl, aminocarbonyl, C_{1-3}-alkylamino-carbonyl, di-(C_{1-3}-alkyl)aminocarbonyl, 2,2,2-trifluoroethylaminocarbonyl, pyrrolidinocarbonyl, piperidinocarbonyl or cyano group wherein two adjacent hydrogen atoms may also be replaced by a methylenedioxy or 1,2-ethylenedioxy group,

by a heteroaryl group optionally substituted in the carbon skeleton by a fluorine, chlorine, bromine or iodine atom, by a straight-chain or branched C_{1-4}-alkyl or C_{1-3}-alkoxy group, by a trifluoromethyl, phenyl or cyano group,

by a phenyl-C C- or phenyl-CH=CH- group which may be substituted in the phenyl moiety by a fluorine, chlorine, bromine or iodine atom, by a straight-chain or branched C_{1-4}-alkyl or C_{1-3}-alkoxy group, by a trifluoromethyl, dimethylamino, phenyl or cyano group,

by an indolyl, benzimidazolyl, quinolinyl, isoquinolinyl, quinoxalinyl or quinazolinyl group bonded via a carbon atom or, in the case of the first two groups, via a nitrogen atom,

by a phenyl group which is substituted by a heteroaryl group optionally substituted in the carbon skeleton by a fluorine, chlorine, bromine or iodine atom, by a straight-chain or branched C_{1-4}-alkyl group, by a C_{3-7}-cycloalkyl, trifluoromethyl, phenyl or cyano group,

by a C_{5-6}-cycloalkyl group or a 5- or 6-membered cycloalkyleneimino group which

may be fused to a phenyl ring in each case via two adjacent carbon atoms or

wherein the two hydrogen atoms of the methylene group in the 3 position of a 5-membered ring or in the 4 position of a 6-membered ring may be replaced by an n-butylene, n-pentylene, n-hexylene, 1,2-ethylenedioxy or 1,3-propylenedioxy group or by an oxygen atom or

wherein the methylene group in the 4 position of a 6-membered ring may be replaced by an oxygen or sulphur atom or by an imino group optionally substituted by a C_{1-3}-alkyl, phenyl, C_{1-4}-alkyl-carbonyl, C_{1-4}-alkoxy-carbonyl or benzoyl group,

by a phenylaminosulphonylphenyl or phenylsulphonyl-aminophenyl group,

by a C_{3-7}-cycloalkyl group, wherein

in each case the methylene group in the 4 position of the cyclohexyl group may be replaced by an oxygen or sulphur atom or by an imino group optionally substituted by a C_{1-3}-alkyl, phenyl, C_{1-3}-alkyl-carbonyl, benzoyl, C_{1-3}-alkyl-aminocarbonyl, di-(C_{1-3}-alkyl)-aminocarbonyl, phenylaminocarbonyl or N-(C_{1-3}-alkyl)-phenylaminocarbonyl group,

by a phenylcarbonylamino-phenyl, phenylaminocarbonyl-phenyl, N-(C_{1-3}-alkyl)-phenylcarbonylamino-phenyl or N-(C_{1-3}-alkyl)-phenylaminocarbonyl-phenyl group, phenyl-C_{1-3}-alkyl-aminocarbonyl-phenyl, N-(C_{1-3}-alkyl)-phenyl-C_{1-3}-alkyl-aminocarbonyl-phenyl, C_{3-7}-cycloalkyl-carbonylamino-phenyl, N-(C_{1-3}-alkyl)-C_{3-7}-aycloalkyl-carbonylamino-phenyl, C_{3-7}-cycloalkyl-aminocarbonyl-phenyl, N-(C_{1-3}-alkyl)-C_{3-7}-cycloalkyl-aminocarbonyl-phenyl, C_{4-6}-alkyl-carbonylamino-phenyl, N-(C_{1-3}-alkyl)-C_{4-6}-alkyl-carbonylamino-phenyl, heteroarylcarbonylamino-phenyl, N-(C_{1-3}-alkyl)-heteroarylcarbonylamino-phenyl, pyrrolidinocarbonyl-amino-phenyl, piperidinocarbonyl-amino-phenyl, N-(C_{1-3}-alkyl)-pyrrolidinocarbonyl-amino-phenyl, N-(C_{1-3}-alkyl)-piperidinocarbonyl-amino-phenyl, phenylaminocarbonylamino-phenyl, N-(C_{1-3}-alkyl)-phenylaminocarbonylamino-phenyl or N,N-di-(C_{1-3}-alkyl)-phenylaminocarbonylamino-phenyl group,

by a hydroxycarbonyl, C_{1-3}-alkoxycarbonyl, phenyloxycarbonyl or heteroaryloxycarbonyl group,

by an aminocarbonyl, C_{1-3}-alkyl-aminocarbonyl, benzyl-aminocarbonyl, di-(C_{1-3}-alkyl)-aminocarbonyl, aminocarbonyl-C_{1-3}-alkyl-aminocarbonyl or C_{1-3}-alkoxy-carbonyl-C_{1-3}-alkyl-aminocarbonyl group,

a straight-chain C_{2-3}-alkyl group which is terminally substituted

by a hydroxy, C_{1-3}-alkoxy, phenoxy or phenyl-C_{1-3}-alkoxy group or

by an amino, C_{1-3}-alkylamino, di-(C_{1-3}-alkyl)-amino, C_{1-3}-alkyl-carbonylamino, N-(C_{1-3}-alkyl)-C_{1-3}-alkyl-carbonylamino, phenylcarbonylamino or N-(C_{1-3}-alkyl)phenylcarbonylamino group,

or R^5 and R^6 together with the enclosed nitrogen atom denote a pyrrolidino or piperidino group which

may each be fused via two adjacent carbon atoms to a phenyl ring optionally substituted by one or two C_{1-3}-alkoxy groups, by an amino, C_{1-3}-alkylamino, acetylamino, aminomethylcarbonylamino or dimethylaminomethylcarbonylamino group,

or a piperazino, morpholino or thiomorpholino group, while the nitrogen atom in the 4 position of the piperazino group may be substituted by a C_{1-3}-alkyl, phenyl, C_{1-3}-alkylcarbonyl, benzoyl, C_{1-3}-alkyl-aminocarbonyl or phenylaminocarbonyl group, and

R^7 denotes a hydrogen, fluorine, chlorine or bromine atom or a C_{1-3}-alkyl group or a nitro or amino group,

while, unless otherwise specified, by the term heteroaryl group mentioned above is meant a 2-pyridyl, 3-pyridyl, 4-pyridyl, pyrazinyl, 2-pyrimidinyl, 4-pyrimidinyl, 5-pyrimidinyl, 3-pyridazinyl, 4-pyridazinyl, 1-pyrrolyl, 2-pyrrolyl, 3-pyrrolyl, 2-furyl, 3-furyl, 2-thienyl, 3-thienyl, 1-imidazolyl, 2-imidazolyl, 4-imidazolyl, 1-pyrazolyl, 3-pyrazolyl, 4-pyrazolyl,

2-thiazolyl, 4-thiazolyl, 5-thiazolyl, [1,2,3]-thiadiazol-4-yl, benzimidazol-2-yl, benzimidazol-5-yl, or imidazo-[1,2-a]pyridin-2-yl group optionally substituted in the carbon skeleton by up to three C_{1-3}-alkyl groups and

all the abovementioned phenyl groups, heteroaryl groups, aromatic or heteroaromatic parts of molecules may optionally additionally be substituted in the carbon skeleton by a fluorine, chlorine or bromine atom, by a cyano group or by a straight-chain or branched C_{1-3}-alkyl or trifluoromethyl group,

and/or a hydrogen atom bonded to a nitrogen atom of a heteroaryl group or heteroaromatic part of a molecule may be replaced by a C_{1-3}-alkyl, phenyl or C_{1-3}-alkylcarbonyl group,

or a tautomer, a diastereomer, or an enantiomer, or mixtures thereof or a salt thereof.

3. A compound of formula I according to claim 1, wherein

R^1 denotes a hydrogen, fluorine, chlorine or bromine atom, a C_{1-3}-alkyl or trifluoromethyl group,

R^2 denotes a hydrogen atom or a C_{1-3}-alkyl group or

R^1 and R^2 in the ortho, ortho' position of the biphenyl group of formula I may together also denote a carbonyl group,

R^3 and R^4 each denote a hydrogen atom,

R^5 denotes a hydrogen atom or a C_{1-3}-alkyl group,

R^6 denotes a straight-chain or branched C_{1-4}-alkyl group,

a phenyl, biphenyl or phenyl-C_{1-3}-alkylphenyl group,

a straight-chain C_{1-3}-alkyl group optionally substituted in the 1 position by a cyclopropyl group or a C_{1-3}-alkyl group which is terminally substituted

by a phenyl or biphenyl group which may be substituted in each case by a fluorine, chlorine or bromine atom, by a straight-chain or branched C_{1-4}-alkyl group, by a trifluoromethyl, hydroxy, phenylamino or N-(C_{1-3}-alkyl)-phenylamino group,

by a 2-pyridyl, 3-pyridyl, 4-pyridyl or 1H-benzimidazol-2-yl group,

by a phenyl group which is substituted by a 2-pyridyl, 3-pyridyl, 4-pyridyl, pyrazinyl, 2-pyrimidinyl, 4-pyrimidinyl, 5-pyrimidinyl, 3-pyridazinyl, 4-pyridazinyl, 1-pyrrolyl, 2-pyrrolyl, 3-pyrrolyl, 1-imidazolyl, 2-imidazolyl, 4-imidazolyl, 1-pyrazolyl, 3-pyrazolyl, 4-pyrazolyl, 2-thiazolyl, 4-thiazolyl, 5-thiazolyl, [1,2,3]-thiadiazol-4-yl, benzimidazol-2-yl or imidazo-[1,2-a]pyridin-2-yl group, wherein the abovementioned heteroaromatic groups may be substituted in the carbon skeleton by a fluorine, chlorine or bromine atom, by a phenyl, C_{1-4}-alkyl, trifluoromethyl, C_{1-3}-alkoxy, dimethylamino or C_{3-7}-cycloalkyl group,

by a phenyl group which is substituted by a pyrrolidino or piperidino group optionally fused to a phenyl group,

by a phenyl-C C- group which may be substituted in the phenyl moiety by a fluorine, chlorine or bromine atom, by a straight-chain or branched C_{1-4}-alkyl or C_{1-3}-alkoxy group, by a trifluoromethyl or phenyl group,

by a 4-piperidinyl group optionally substituted at the nitrogen atom by a C_{1-3}-alkyl, C_{1-3}-alkyl-carbonyl, benzoyl, C_{1-3}-alkylaminocarbonyl, di-(C_{1-3}-alkyl)-aminocarbonyl, phenylamino-carbonyl or N-(C_{1-3}-alkyl)-phenylaminocarbonyl group,

by a phenylcarbonylamino-phenyl, phenylaminocarbonyl-phenyl, N-(C_{1-3}-alkyl)-phenylcarbonylamino-phenyl or N-(C_{1-3}-alkyl)-phenylaminocarbonyl-phenyl group optionally substituted in the terminal phenyl moieties by a C_{1-3}-alkyl group

or

by a heteroaryl-carbonylamino-phenyl or N-(C_{1-3}-alkyl)-heteroaryl-carbonylamino-phenyl group, wherein the heteroaryl moiety is selected from among 2-pyridyl, 3-pyridyl, 4-pyridyl, pyrazinyl, 2-pyrimidinyl, 4-pyrimidinyl, 5-pyrimidinyl, 3-pyridazinyl, 4-pyridazinyl, 1-pyrrolyl, 2-pyrrolyl, 3-pyrrolyl, 1-imidazolyl, 2-imidazolyl, 4-imidazolyl, 1-pyrazolyl, 3-pyrazolyl, 4-pyrazolyl, 2-thiazolyl, 4-thiazolyl, 5-thiazolyl and [1,2,3]-thiadiazol-4-yl, wherein a hydrogen atom bound to a nitrogen atom of a heteroaromatic group and/or a hydrogen atom bound to a carbon atom of a heteroaromatic group may in each case be replaced by a C_{1-3}-alkyl group, and

R^7 denotes a hydrogen, fluorine, chlorine or bromine atom, a C_{1-3}-alkyl group or an amino group,

while all the abovementioned phenyl groups, heteroaryl groups, aromatic or heteroaromatic parts of molecules in the carbon skeleton may optionally additionally be substituted by a fluorine, chlorine or bromine atom, by a straight-chain or branched C_{1-3}-alkyl group, by a cyano or a trifluoromethyl group,

or a tautomer, a diastereomer, or an enantiomer, or mixtures thereof or a salt thereof.

4. A compound of formula I according to claim 1 selected from the group consisting of:

(a) N-[4-(3-Methyl-5-phenyl-pyrazol-1-yl)-phenylmethyl]-3-(4'-trifluoromethylbiphenyl-2-carbonylamino)-benzoic acid amide;

(b) N-(4'-Methylbiphenyl-4-methyl)-3-(biphenyl-2-carbonylamino)-benzoic acid amide,

(c) N-[4-(Pyridin-2-yl-carbonylamino)-phenylmethyl]-3-(4'-trifluoromethylbiphenyl-2-carbonylamino)-benzoic acid amide,

(d) N-[3-(4-Isopropylphenyl)-prop-2-ynyl]-3-(4'-trifluoromethylbiphenyl-2-carbonylamino)-benzoic acid amide and

(e) N-[4-(1,2,3,4-Tetrahydroquinolin-1-yl)-phenylmethyl]-3-(4'-trifluoromethylbiphenyl-2-carbonylamino)-benzoic acid amide,

and the salts thereof.

5. A compound according to any one of claims 1 to 4 in the form of its physiologically acceptable salt.

6. A pharmaceutical composition comprising a compound according to any one of claims 1 to 4, or a physiologically acceptable salt thereof, together with one or more inert carriers and/or diluents.

7. A method of lowering the plasma level of atherogenic lipoproteins in a subject in need thereof, comprising adminstering to said subject an effective amount of a compound of formula I according to any one of claims 1 to 4 or a physiologically acceptable salt thereof.

8. A method of treating hyperlipidaemias, atherosclerosis or the clinical sequelae thereof, diabetes mellitus, adiposity or pancreatitis in a subject in need thereof, comprising adminstering to said subject an effective amount of a compound of formula I according to any one of claims 1 to 4 or a physiologically acceptable salt thereof.